Name:

at1113exam: Expand, factor, and solve quadratics (v336)

1. Expand the following expression into standard form.

$$(5x + 7)(5x - 7)$$

2. Expand the following expression into standard form.

$$(4x + 7)(5x + 2)$$

3. Solve the equation.

$$(5x - 3)(7x - 4) \;=\; 0$$

4. Expand the following expression into standard form.

$$(5x + 8)^2$$

5. Factor the expression.

$$x^2 + 6x + 8$$

6. Solve the equation.

$$8x^2 - 7x - 6 \;=\; 5x^2 + 4x - 2$$

7. Factor the expression.

$$16x^2 - 49$$

8. Solve the equation with factoring by grouping.

$$10x^2 + 15x + 8x + 12 \;=\; 0$$